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## (54) METHOD FOR EVALUATING TOXICITY WITH USING CULTURED CELL

(57)Abstract:

PROBLEM TO BE SOLVED: To provide a method for simply evaluating toxicity or safety of objects to be evaluated, e.g. chemicals, cosmetics, detergents, etc., without carrying out a toxicity evaluation to the substances for many concentration points.

SOLUTION: According to the toxicity evaluation method, an animal cultured cell is embedded, and a cultured collagen gel substance is processed for an effective time with a substance to be evaluated, whereby an intercellular enzyme emitted from the substance to be evaluated to the cultured substance is measured with time.

hydrochloride in a biodegradable carrier.

### [Claim(s)]

[Claim 1] A sustained release injection for local anesthesia, characterized by containing a local anesthetic in a biodegradable carrier.

[Claim 2] The sustained release injection for local anesthesia according to claim 1, wherein the local anesthetic is any of cocaine, ethyl aminobenzoate, procaine, a tetracaine, oxybuprocaine, dibucaine, lidocaine, mepivacaine, oxethazaine or acid addition salts thereof.

[Claim 3] The sustained release injection for local anesthesia according to claim 1, wherein the local anesthetic is lidocaine or its hydrochloride.

[Claim 4] The sustained release injection for local anesthesia according to claim 1, wherein the carrier is a mixture of one or two or more selected from a collagen, gelatin, a fibrinogen, a fibrin, polylactic acid, polyglycolic acid, and a copolymer of polylactic acid and polyglycolic acid.

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## METHOD FOR EVALUATING TOXICITY USING CULTURED CELL

#### Abstract:

PROBLEM TO BE SOLVED: To provide a method for simply evaluating toxicity or safety of subject substances, e.g. chemicals, cosmetics, detergents, etc., without carrying out a toxicity evaluation for the subject substances at many concentration points.

SOLUTION: A toxicity evaluation method, characterized by that an animal cultured cell is embedded, and a cultured collagen gel culture is processed for an effective time with a subject substance, whereby an intercellular enzyme released from the subject substance to the culture is measured with time.

#### [Claim(s)]

[Claim 1] A toxic evaluation method characterized by carrying out embedding of the animal culture cells, and measuring the intracellular enzyme released into the culture from the subject substance with time, by processing a cultured collagen gel culture with a subject substance for an effective time.

[Claim 2] The toxic evaluation method according to claim 1, wherein an animal culture cell is human fibrocyte.

[Claim 3] The toxic evaluation method according to claim 1, wherein the intracellular enzyme released from a subject substance into a culture is lactate dehydrogenase.

[Claim 4] The toxic evaluation reagent, wherein the animal culture cells are enbedded, and the cultured collagen gel culture, culture medium, and intracellular enzyme measurement reagent are contained.